



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER OF PATENTS AND TRADEMARKS  
Washington, D.C. 20231  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/942,643	08/31/2001	Hideharu Matsushita	1418.1007	8806

21171 7590 10/18/2002

STAAS & HALSEY LLP  
700 11TH STREET, NW  
SUITE 500  
WASHINGTON, DC 20001

EXAMINER	
GARBOWSKI, LEIGH M	
ART UNIT	PAPER NUMBER

2825

DATE MAILED: 10/18/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	Application No.	Applicant(s)
	09/942,643	MATSUSHITA ET AL.
Examiner	Art Unit	
Leigh Marie Garbowski	2825	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

1) Responsive to communication(s) filed on 10 July 2002.

2a) This action is FINAL.                  2b) This action is non-final.

3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

4) Claim(s) 1-10 is/are pending in the application.

4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.

5) Claim(s) \_\_\_\_\_ is/are allowed.

6) Claim(s) 1 and 6 is/are rejected.

7) Claim(s) 2-5 and 7-10 is/are objected to.

8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

9) The specification is objected to by the Examiner.

10) The drawing(s) filed on 31 August 2001 is/are: a) accepted or b) objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11) The proposed drawing correction filed on \_\_\_\_\_ is: a) approved b) disapproved by the Examiner.  
If approved, corrected drawings are required in reply to this Office action.

12) The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) All b) Some \* c) None of:  
1. Certified copies of the priority documents have been received.  
2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.

14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).  
a) The translation of the foreign language provisional application has been received.

15) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

1) <input type="checkbox"/> Notice of References Cited (PTO-892)	4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s) _____
2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)	5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)
3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____	6) <input type="checkbox"/> Other: _____

**DETAILED ACTION**

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claims 1 and 6 are rejected under 35 U.S.C. 102(b) as being anticipated by Agonafer et al. [U.S. Patent #5,644,687].

As per claim 1, Agonafer et al. disclose a PCB design system [column 4, lines 45-67] for generating a 3D model of a PCB which mounts a component on a PCB [column 5, lines 9-20, 38-59] and for performing with a three-dimensional CAD system [column 7, lines 34-36] a mounting design including a cabinet [column 4, lines 10-27] comprising: a converter for converting the PCB into one or more models based on attributes preliminarily added to the component [column 5, line 60-column 6, line 15].

As per claim 6, Agonafer et al. disclose a method for generating a 3D model of a PCB which mounts a component on a PCB [column 5, lines 9-20, 38-59] and for performing with a three-dimensional CAD system [column 7, lines 34-36] a mounting design including a cabinet [column 4, lines 10-27] comprising: converting the PCB into one or more models based on attributes preliminarily added to the component [column 5, line 60-column 6, line 15].

***Allowable Subject Matter***

Claims 2-5 and 7-10 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

The following is a statement of reasons for the indication of allowable subject matter: although the prior art of record discloses systems and methods for generating 3D models of a PCB, the prior art of record does not specifically disclose or teach the division-type model as recited in claims 2 and 7 [which was best interpreted with respect to the specification at page 9, lines 18-20 and page 12, lines 22-27], the unit-type model as recited in claims 3 and 8 [which was best interpreted with respect to the specification at page 9, lines 16-18 and page 12, lines 10-17], the library-type model as recited in claims 4 and 9 [which was best interpreted with respect to the specification at page 9, lines 21-23 and page 12, lines 28-31], the single-type model as recited in claims 5 and 10 [which was best interpreted with respect to the specification at page 9, lines 20-21 and page 14, line 9-17].

#### ***Response to Arguments***

Applicant's arguments filed 10 July 2002 have been fully considered but they are not persuasive. The examiner maintains that Agonafer et al. anticipates the broadly claimed subject matter of the independent claims. The specific language that the applicant argues against regarding Agonafer et al. does not appear in the claim language, as such this particular interpretation thereof is not excluded. The term of "converting" can suggest more than converting per se, even the reference uses the term to describe the functioning that is being performed. A broadest reasonable

interpretation of the claimed subject matter suggests to one of ordinary skill in the art that the functioning is merely to convert or transform or otherwise manipulate data describing a PCB into one or more models. The context of "based on attributes preliminarily added to the component" does not exclude the arguments against Agonafer et al., surely the applicant can appreciate that attributes are added at some point, the claimed language does not suggest anything more specific than that which was rejected. Furthermore, Agonafer et al. consistently recite the plural of models, e.g., one or more models.

***Conclusion***

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Art Unit: 2825

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Leigh Marie Garbowski whose telephone number is 703-305-9753. The examiner can normally be reached on days.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Matthew Smith can be reached on 703-308-1323. The fax phone numbers for the organization where this application or proceeding is assigned are 703-308-3431 for regular communications and 703-308-3431 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-1782.

Leigh Marie Garbowski

October 17, 2002

*L.M.G.*  
LEIGH M. GARBOWSKI  
PATENT EXAMINER